



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
-----------------	-------------	----------------------	---------------------	------------------

10/559,654

12/05/2005

Mitsuyoshi Furuhashi

062807-0302

2965

20277 7590 11/13/2009
MCDERMOTT WILL & EMERY LLP
600 13TH STREET, N.W.
WASHINGTON, DC 20005-3096

EXAMINER

AMADIZ, RODNEY

ART UNIT

PAPER NUMBER

2629

MAIL DATE

DELIVERY MODE

11/13/2009

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/559,654	Applicant(s) FURUHATA ET AL.	
	Examiner RODNEY AMADIZ	Art Unit 2629	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 17 July 2009.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-8 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-8 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Claim Rejections - 35 USC § 112

1. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

2. Claim 5 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. For instance, claim 5 recites the limitation "each signal tone level" in line 10. There is insufficient antecedent basis for this limitation in the claim. In the rejection below, the Examiner has interpreted "each signal tone level" as "an individual tile of the tile display pattern".

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

4. Claims 1 and 2 are rejected under 35 U.S.C. 102(b) as being anticipated by Jun (JP2001-313953A—hereinafter "Jun").

As to **Claim 1**, Jun teaches a display device comprising:

gamma correcting means (***See Fig. 2***) for executing a gamma correction with respect to an input video signal (***¶'s 12-15***);

gamma adjusting means (**See Fig. 2**) for displaying an adjusted state having an adjustment pattern signal (**See Fig. 3, 70**) for gamma adjustment and a gamma correction value (**Fig. 3, 63 and 64**) wherein the displayed adjustment pattern signal is a tile display pattern of a gray scale corresponding to a gamma adjustment point (**See Fig. 3, 70**); and

display means (**Fig. 3, 61**) for extracting a specific still image (**Fig. 3, 69**) from said input video signal and displaying on said still image said still image gamma-corrected by said gamma correcting means (**¶'s 34-39**);

wherein said adjustment pattern signal (**Fig. 3, 70**) and said gamma correction value (**Fig. 3, 63 and 64**) and said gamma-corrected still image (**Fig. 3, 70**) are displayed on the same screen.

As to **Claim 2**, Jun teaches that said gamma correcting means is arranged to execute at least one of gamma adjustment and white balance adjustment according to an input intensity level of said video signal and to have storage means for storing data based on said adjustment amount (**¶'s 30-42**).

Claim Rejections - 35 USC § 103

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Art Unit: 2629

6. Claims 3 and 4 are rejected under 35 U.S.C. 103(a) as being unpatentable over Jun.

As to **Claim 3**, Jun fails to teach said gamma adjusting means is arranged to select one of a prepared plural gamma characteristics and to adjust a correction value on the basis of said selected gamma characteristic. The Examiner takes Official Notice that it is old and well-known to select one of a prepared plural gamma characteristics and to adjust a correction value on the basis of said selected gamma characteristic. At the time the invention was made, it would have been obvious to a person of ordinary skill in the art to store a plurality of prepared gamma characteristics, select one of the plurality of prepared gamma characteristics and adjust a correction value on the basis of said selected gamma characteristic in the display device taught by Jun in order to allow the user to utilize customized gamma settings thereby saving time.

As to **Claim 4**, Jun teaches that the adjustment pattern signal is displayed (**Fig. 3, 70**). Jun, however, fails to teach that said adjustment pattern signal is selected from a plurality of adjustment pattern signals. The Examiner takes Official Notice that it is old and well-known to select an adjustment pattern signal from a plurality of adjustment pattern signals. At the time the invention was made, it would have been obvious to a person of ordinary skill in the art to store a plurality of adjustment pattern signals and to select one of the plurality of adjustment pattern signals in the display device taught by Jun in order to allow the user to utilize customized adjustment pattern signals, thereby saving time.

Art Unit: 2629

7. Claims 5-8 are rejected under 35 U.S.C. 103(a) as being unpatentable over Jun in view of Taka et al. (U.S. Patent 6,992,796—hereinafter “Taka”).

As to **Claim 5**, Jun teaches a display device for processing an input image signal and displaying the processed image signal on a screen, the display device comprising:

an input unit (**See Fig. 1**) configured to have input therein an instruction signal regarding a gamma correction;

a gamma correcting unit (**See Fig. 3, note 66 and 67**) configured to execute said gamma correction when said instruction signal is inputted;

a memory (**Fig. 2, 44-46**) configured to store a gamma correction characteristic (**¶’s 15 and 25-39**), a tile display pattern (**Fig. 3, 70**);

a processor (**Fig. 2, 42**) configured to control said gamma correcting unit so that said gamma correction is reflected in said input image signal when said instruction signal is inputted (**¶’s 16-39**).

Jun, however, fails to teach adjustment tones having values from a lowest adjustment tone value to a highest adjustment tone value, an adjustment value for each of said adjustment tones and a menu display unit configured to display a gamma adjustment menu showing adjustment tone levels of the respective adjustment tones.

Examiner cites Taka to teach adjustment tones having values from a lowest adjustment tone value to a highest adjustment tone value (**Fig. 26, adjustment tones 1-16**), an adjustment value for each of said adjustment tones (**value illustrated by individual bars**) and a menu display unit configured to display a gamma adjustment menu showing adjustment tone levels of the respective adjustment tones. (**See Fig. 26**).

Art Unit: 2629

At the time the invention was made, it would have been obvious to a person of ordinary skill in the art to provide adjustment tones having values from a lowest adjustment tone value to a highest adjustment tone value, an adjustment value for each of said adjustment tones and a menu display unit configured to display a gamma adjustment menu showing adjustment tone levels of the respective adjustment tones as taught by Taka in the display device taught by Jun in order to provide the user with an enhanced gamma correcting means capable of multi-tone gamma correction.

Lastly, the combination of Jun and Taka teaches that each value of the adjustment tones of said gamma correction characteristic respectively corresponds to an individual tile of the tile display pattern. For instance, in figure 3, Jun teaches that the tile display pattern has four tiles. Jun, however, is not limited to just 4 tiles, in paragraph 40, Jun states that “although brightness is changing to four steps, it may be made for the gray scale pattern 70 in drawing 3 to display the gray scale pattern to which brightness was changed on more stages.” (emphasis added). In other words, Jun’s tile display pattern (**70**) may be more than 4 tiles. Taka, on the other hand, teaches that there are 16 adjustment tones. Because Jun teaches that there can be any number of tiles on the display pattern, the combination of Jun and Taka teaches that the adjustment tones (**Taka, Figure 26, adjustment tones 1-16**) respectively correspond to the individual tiles of the display pattern (**Jun, Fig. 3, 70—i.e. now 16 tiles**).

As to **Claim 6**, Jun teaches a frame memory (**Fig. 2, 44-46**) for storing said image signal therein,

wherein said processor is further configured to overlap said adjustment pattern on said image signal in said frame memory (**¶s 15 and 42**).

As to **Claim 7**, Jun, as modified by Taka, teaches selecting an adjustment point to be adjusted for said gamma correction based on the adjustment pattern (**Taka—See Fig. 26, note that point 10 is being adjusted**). Jun, as modified by Taka, however, fails to teach that said adjustment pattern comprises a plurality of adjustment patterns, and said input unit is further configured to select one of said plurality of adjustment patterns. The Examiner takes Official Notice that it is old and well-known in the art to provide multiple adjustment patterns and to select one of the adjustment patterns. At the time the invention was made, it would have been obvious to a person of ordinary skill in the art to store multiple adjustment patterns and select one of the adjustment patterns in the display device taught by Jun, as modified by Taka, in order to allow the user to utilize customized adjustment patterns thereby saving time.

As to **Claim 8**, Jun, as modified by Taka, teaches that said processor is further configured to display respective adjustment values of said adjustment tones (**Taka, Fig. 26, note that adjustment values are illustrated by the individual bars**).

Response to Arguments

8. Applicant's arguments with respect to claims 1-4 have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

9. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Inquiries

Any inquiry concerning this communication or earlier communications from the examiner should be directed to RODNEY AMADIZ whose telephone number is (571)272-7762. The examiner can normally be reached on M-F 9:30-5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Sumati Lefkowitz can be reached on (571) 272-3638. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2629

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Sumati Lefkowitz/

Supervisory Patent Examiner, Art Unit 2629

/R. A./

Examiner, Art Unit 2629

11/07/09